



The VLR are vertical multistage, in-line, centrifugal pumps, directly connected to an electric motor. They are not self-priming.

- HIGH HYDRAULIC EFFICIENCY
- STAINLESS STEEL HYDRAULIC END
- MOTOR DESIGNED TO EN STANDARDS

Applications

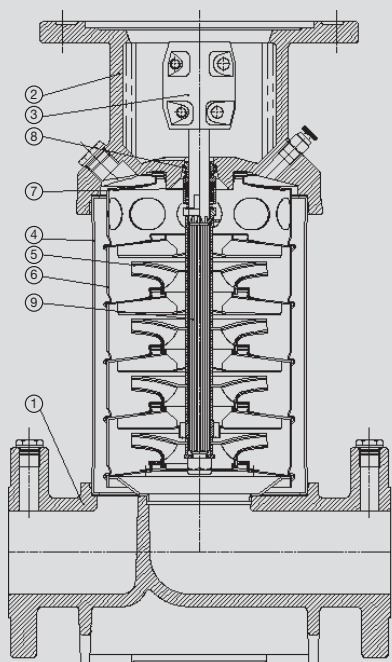
- Water supply
- Pressure Booster Systems
- Irrigation
- High pressure washes
- Firefighting systems
- Boiler supply
- Liquid transfer

Motor

- Asynchronous electric motor with enclosed stator and external ventilation
- Main dimensions are in accordance with DIN and IEC standards
- Design: V18-up to 4,0Kw
V1- to start from 5,5Kw
- Class F insulation
- Level of protection IP 55
- Maximum environmental temperature 40 °C
- Speed of rotation 2900 rpm
- Increased bearings to last longer

Versions Available

- Impeller, diffuser and outside sleeve in stainless steel
- Cast iron base, adapter and motor bracket
- VLR 32 and VLR 66 are equipped with cartridge mechanical seal, in order to avoid a motor disassembling in case of replacement
- All the "A" versions are complete with oval gas cast iron counterflanges
- The "F" version is complete with DIN round flanges



DESIGN FEATURES

Component		Material		
		VLR 2B - 16	VLR 32	VLR 66
1	Pump casing	cast iron EN GJL 200	cast iron EN GJL 500-7U	cast iron EN GJL 250
2	Motor bracket	cast iron EN GJL 200	cast iron EN GJL 200	cast iron EN GJL 200
3	Motor joint	cast iron EN GJS 400	cast iron EN GJL 500-7U	cast iron EN GJL 200
4	Sleeve	Stainless steel X5 CrNi 18-10 (AISI 304)		Stainless steel X2 CrNiMo 17-12-2 (AISI 316L)
5	Impeller	Stainless steel X5 CrNi 18-10 (AISI 304)		Stainless steel X2 CrNiMo 17-12-2 (AISI 316L)
6	Diffuser	Stainless steel X5 CrNi 18-10 (AISI 304)		Stainless steel X2 CrNiMo 17-12-2 (AISI 316L)
7	Rotating seal	silicum carbide	Tungsten carbide	silicum carbide
8	Fixed seal	Graphite		
9	Shaft	Stainless steel X2 CrNiMo 17-12-2 (Aisi 316 L)	Stainless steel X17 CrNi 16-2 (AISI 431)	Stainless steel X2 CrNiMoN 22-5-3 (UNS S 31803)
10	Gaskets	EPDM		

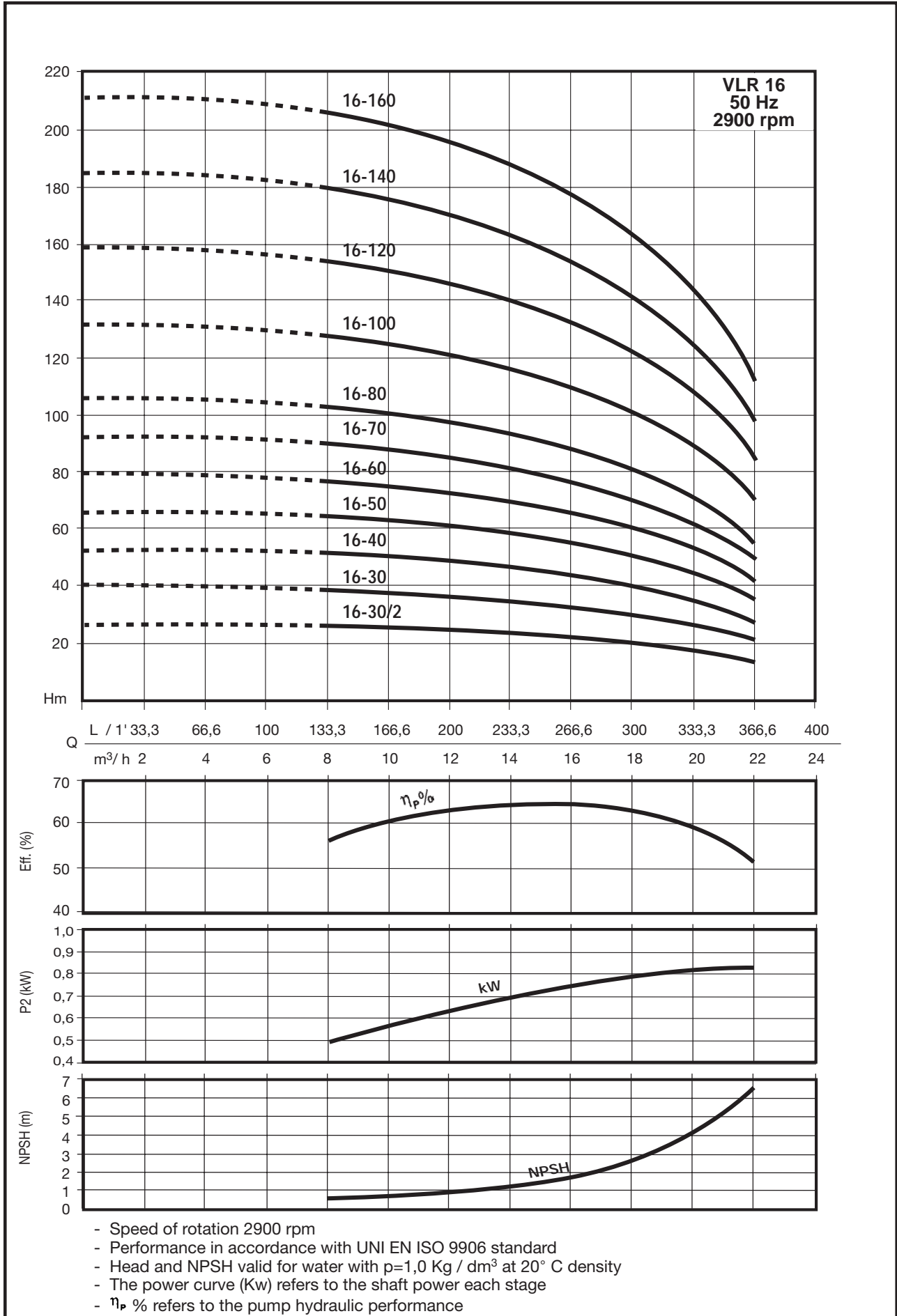
USAGE LIMITATIONS

	VLR 2B - VLR 4		VLR 8	
	Oval flanges	DIN Flanges	Oval flanges	DIN Flanges
Liquid temperature	-15° to +120°		-15° to +120°	
Maximum operating pressure	16 bar	25 bar(max temp 40°) 21 bar(max temp 120°)	16 bar	25 bar(max temp 40°) 23 bar(max temp 120°)
Maximum inlet pressure	VLR2B/30-2 VLR4/20	6bar	16 bar	VLR8/20-VLR8/30 6 bar
	VLR2B/30-VLR2B/110 VLR4/30-VLR4/100 VLR2B/130-VLR2B/260 VLR4/120-VLR4/260	10bar 15bar		VLR8/40-VLR8/200 10 bar
Minimum suction head	Please refer to the NPSH values with a safety margin of 0,5 m			

USAGE LIMITATIONS

	VLR 16	VLR 32	VLR 66
	DIN Flanges	DIN Flanges	DIN Flanges
Liquid temperature	-15° to +120°		-20° to +120°
Maximum operating pressure	VLR16/30-2 - VLR16/160 25 bar (max. temp. 85°) VLR16/30-2 - VLR16/160 23 bar (max. temp. 120°)	Max operating pressure (suction included) 25 bar	Max operating pressure (suction included) up to VLR 66-50 16 bar from VLR 66-60 25 bar
Maximum inlet pressure	VLR16/30-2 - VLR16/30 6 bar VLR16/40 - VLR16/160 10 bar		
Minimum suction head	Please refer to the NPSH values with a safety margin of 0,5 m		

TABLE OF HYDRAULIC PERFORMANCE



PUMP PERFORMANCE

CODE	MODEL	Motor Power		VOLTAGE	Amp.	Q	Discharge head in meters					
		HP	kW				L/1'	100	200	250	300	350
							m ³ /h	6	12	15	18	21
E5501002	VLR 16 - 30/2 FT	3	2,2	3 ~ 230 ÷ 400 V	8,5-4,9	Discharge head in meters	26	25	23	20	16	
E5501003	VLR 16 - 30 FT	4	3	3 ~ 230 ÷ 400 V	11,6-6,7		39	37	34	30	24	
E5501004 E5501104	VLR 16 - 40 FT	5,5	4	3 ~ 230 ÷ 400 V 3 ~ 400 ÷ 690 V	14,3-8,3 8,3-4,8		52	49	46	40	32	
E5501005 E5501105	VLR 16 - 50 FT	7,5	5,5	3 ~ 230 ÷ 400 V 3 ~ 400 ÷ 690 V	19,6-11,3 11,3-8,5		65	62	57	51	40	
E5501006 E5501106	VLR 16 - 60 FT	7,5	5,5	3 ~ 230 ÷ 400 V 3 ~ 400 ÷ 690 V	19,6-11,3 11,3-8,5		78	74	69	61	47	
E5501007 E5501107	VLR 16 - 70 FT	10	7,5	3 ~ 230 ÷ 400 V 3 ~ 400 ÷ 690 V	24,8-14,3 14,3-8,3		91	86	80	71	55	
E5501008 E5501108	VLR 16 - 80 FT	10	7,5	3 ~ 230 ÷ 400 V 3 ~ 400 ÷ 690 V	24,8-14,3 14,3-8,3		104	98	92	81	63	
E5501010 E5501110	VLR 16 - 100 FT	15	11	3 ~ 230 ÷ 400 V 3 ~ 400 ÷ 690 V	36,3-21,0 21,0-12,1		130	123	115	101	79	
E5501012 E5501112	VLR 16 - 120 FT	15	11	3 ~ 230 ÷ 400 V 3 ~ 400 ÷ 690 V	36,3-21,0 21,0-12,1		156	148	137	121	95	
E5501014 E5501114	VLR 16 - 140 FT	20	15	3 ~ 230 ÷ 400 V 3 ~ 400 ÷ 690 V	48,4-28,0 28,0-12,6		182	172	160	142	111	
E5501016 E5501116	VLR 16 - 160 FT	20	15	3 ~ 230 ÷ 400 V 3 ~ 400 ÷ 690 V	48,4-28,0 28,0-12,6		208	197	183	162	126	

Flanges DN 50 PN 25 DIN 2534 / ISO 7005-2 (with 65mm diameter bore)
 Optional counterflanges
 Approximate motor power.
 The real value depends on type of motor installed and type of applications.

TABLE OF SIZES AND WEIGHTS

Model	Dimensions (mm)						Net Weight (kg)
	A	B	L	D	H	D ₃	
VLR 16 - 30/2	460	265	725	185	130	140	52
VLR 16 - 30	464	315	779	200	140	250	56
VLR 16 - 40	509	335	844	200	140	250	59
VLR 16 - 50	575	385	960	260	185	300	82
VLR 16 - 60	620	385	1005	260	185	300	84
VLR 16 - 70	665	385	1050	260	185	300	90
VLR 16 - 80	710	385	1095	260	185	300	92
VLR 16 - 100	830	495	1325	260	185	350	136
VLR 16 - 120	920	495	1425	260	185	350	140
VLR 16 - 140	1010	495	1505	310	230	350	181
VLR 16 - 160	1100	495	1595	310	230	350	185

